

Use Attainability Analysis

for

WBID 1201 Macks Creek

Submitted by

Missouri Department of Natural Resources Staff

To

Missouri Department of Natural Resources
Water Protection Program

JUL 14 2005

Field Data Sheets for Recreational Use Stream Surveys**Data Sheet A - Water Body Identification**

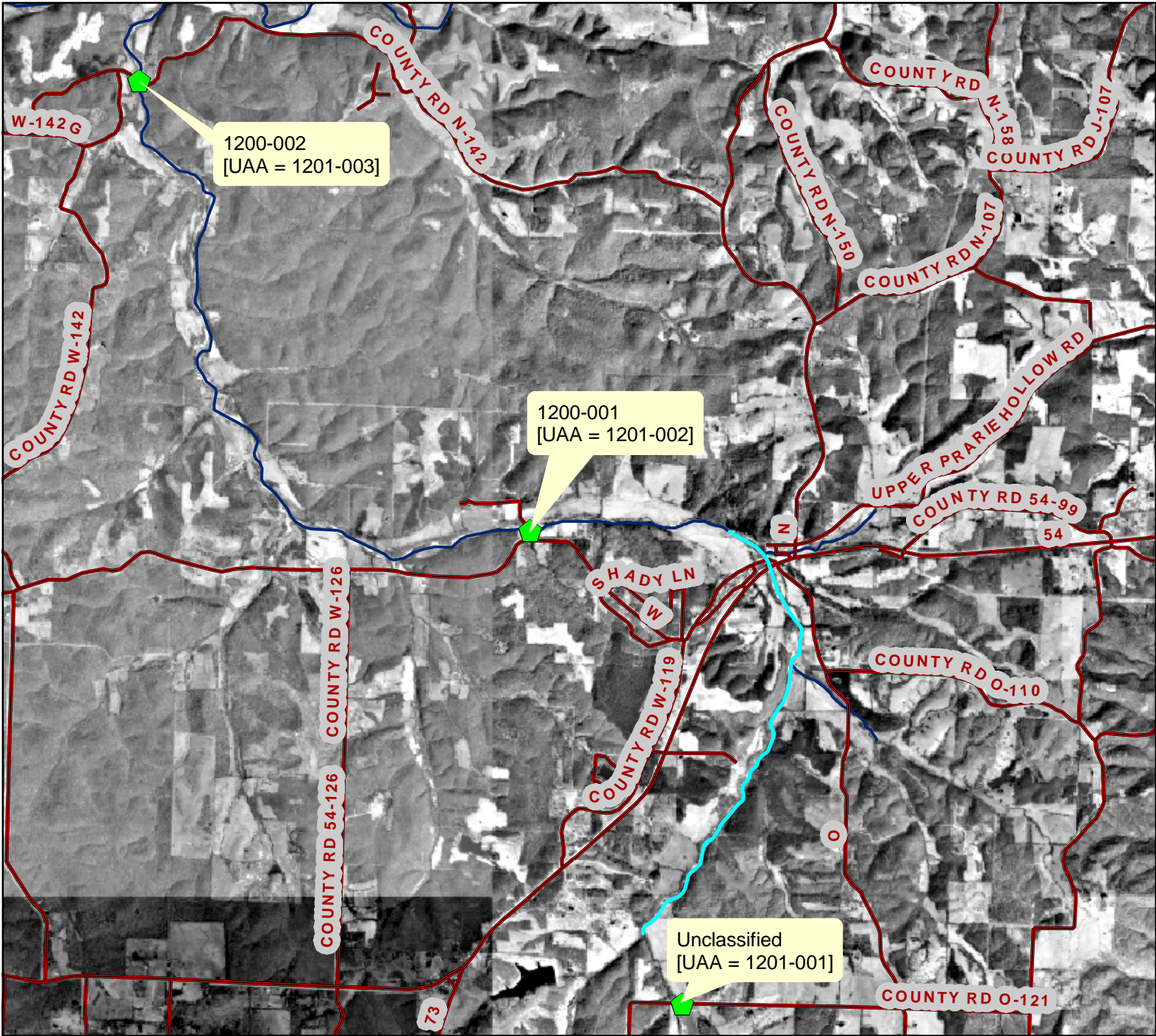
WATER PROTECTION PROGRAM

Water Body Name (from USGS 7.5' quad):	Macks Creek
8-digit HUC:	10290110
Missouri WBID #:	1201
County:	Camden
Upstream Legal Description:	Mill School Rd.
Downstream Legal Description:	
Upstream Coordinates:	N37.92831 W092.97986
Downstream Coordinates:	N38.00887 W093.03913
Discharger Facility Name(s):	Macks Creek Sr Citizen HS
Discharger Permit Number(s):	MD 0109452
Number of Sites Evaluated:	3
Name of Surveyor and Telephone Number:	Aaron Bleibman 816-622-7018
Organization:	Mo DNR - KCRD
Position:	Env. Specialist

I, the undersigned, hereby affirm to the best of my knowledge, that all information reported on this UAA datasheet is true and accurate.

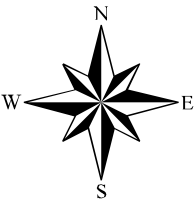
Signed: Aaron Bleibman Date: 7/14/05

Macks Creek (Unclassified, #1201, #1200) Camden County

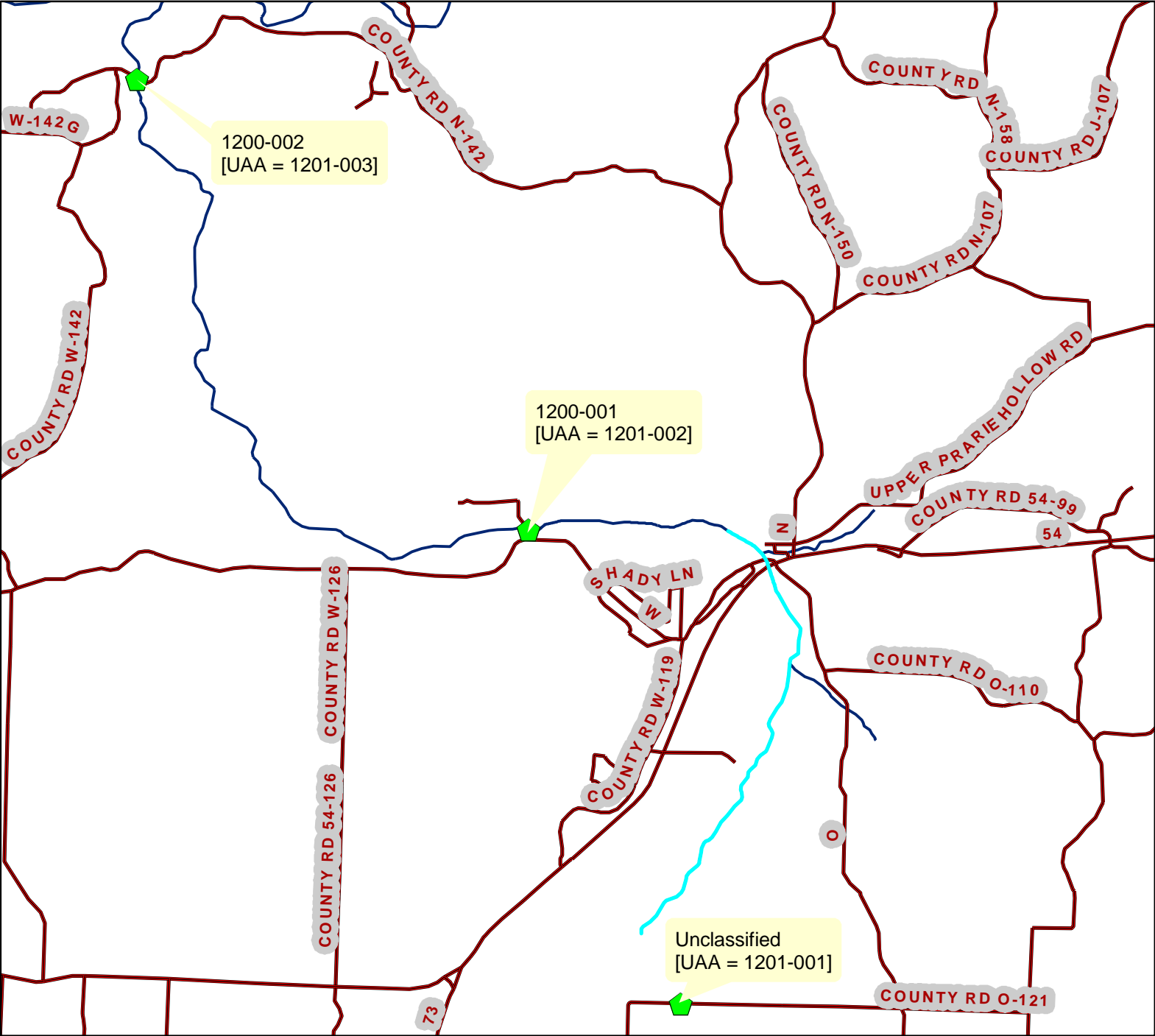


Legend

- Roads
- Classified Waterbodies
- Counties

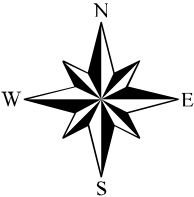


Macks Creek (Unclassified, #1201, #1200) Camden County

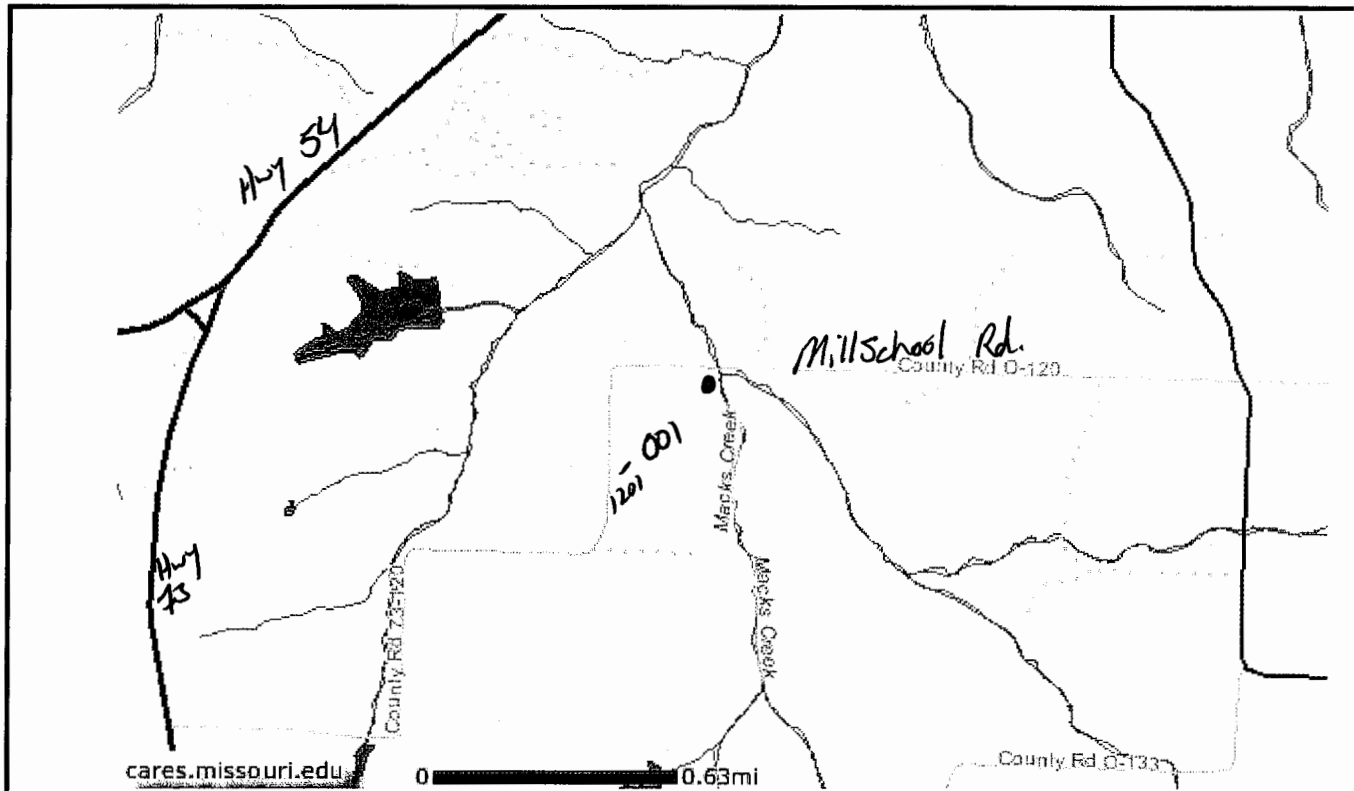


Legend

- Roads
- Classified Waterbodies
- Counties



Macks Creek



Legend

● Water Quality Information System (WQIS)

Roads and Highways

- Interstate
- U.S. Highway
- State Numbered Highway
- State Lettered Highway
- Principal Road
- Road or Street
- Private Road or Drive

1:24,000 Rivers and Streams

- Perennial Stream/River
- Intermittent Stream/River
- Artificial Path (Approx. Centerline)
- Undifferentiated Stream/River
- Canal or Ditch
- Other Hydrologic Feature

NHD Rivers and Streams

- Perennial Stream/River (cont)

- Intermittent Stream/River
- Canal or Ditch
- Artificial Path (Approx. Centerline)
- Other Hydrologic Feature

1:24,000 Water Bodies

- Lake or Pond
- Lake or Pond (Intermittent)
- Reservoir
- Stream or River
- Swamp or Marsh
- Canal or Ditch
- Other Water Body

NHD Water Bodies

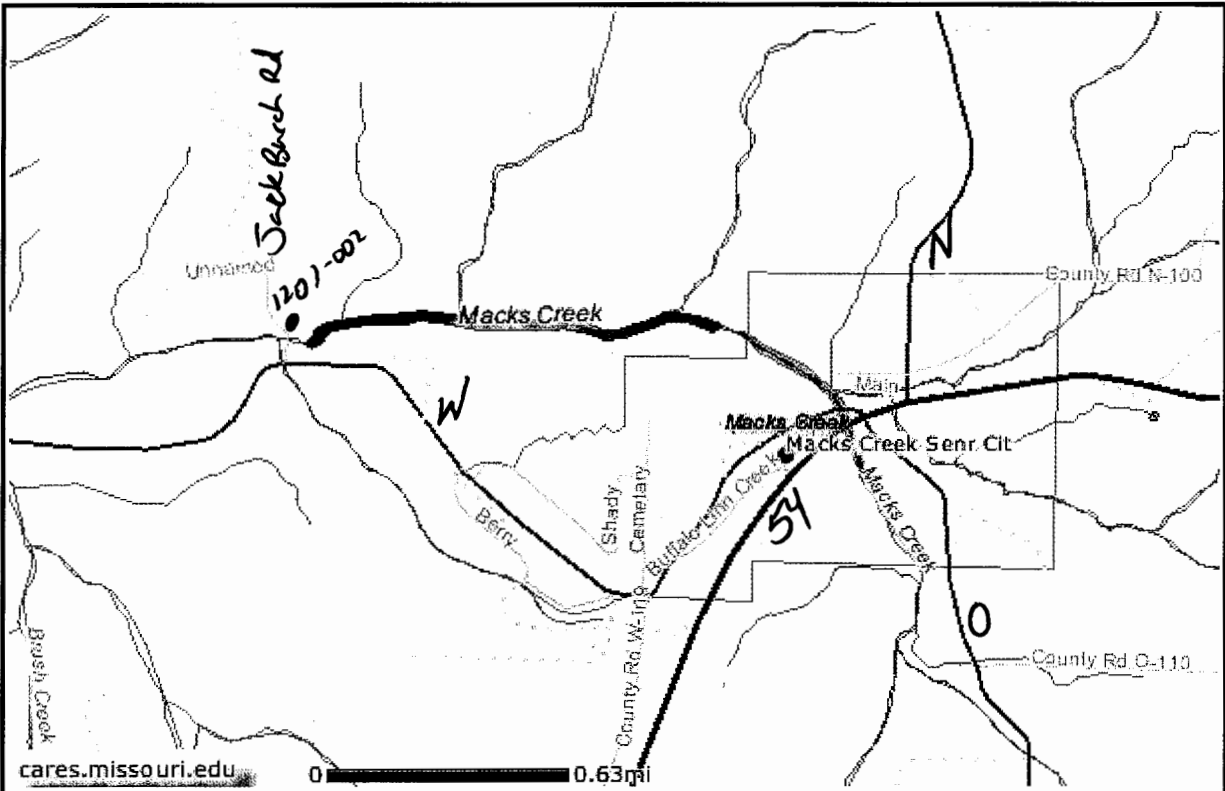
- Lake or Pond
- Lake or Pond (Intermittent)
- Reservoir
- Stream or River
- Swamp or Marsh
- Canal or Ditch

Location Map



Map prepared by:
<http://cares.missouri.edu>, 7/6,

Macks Creek

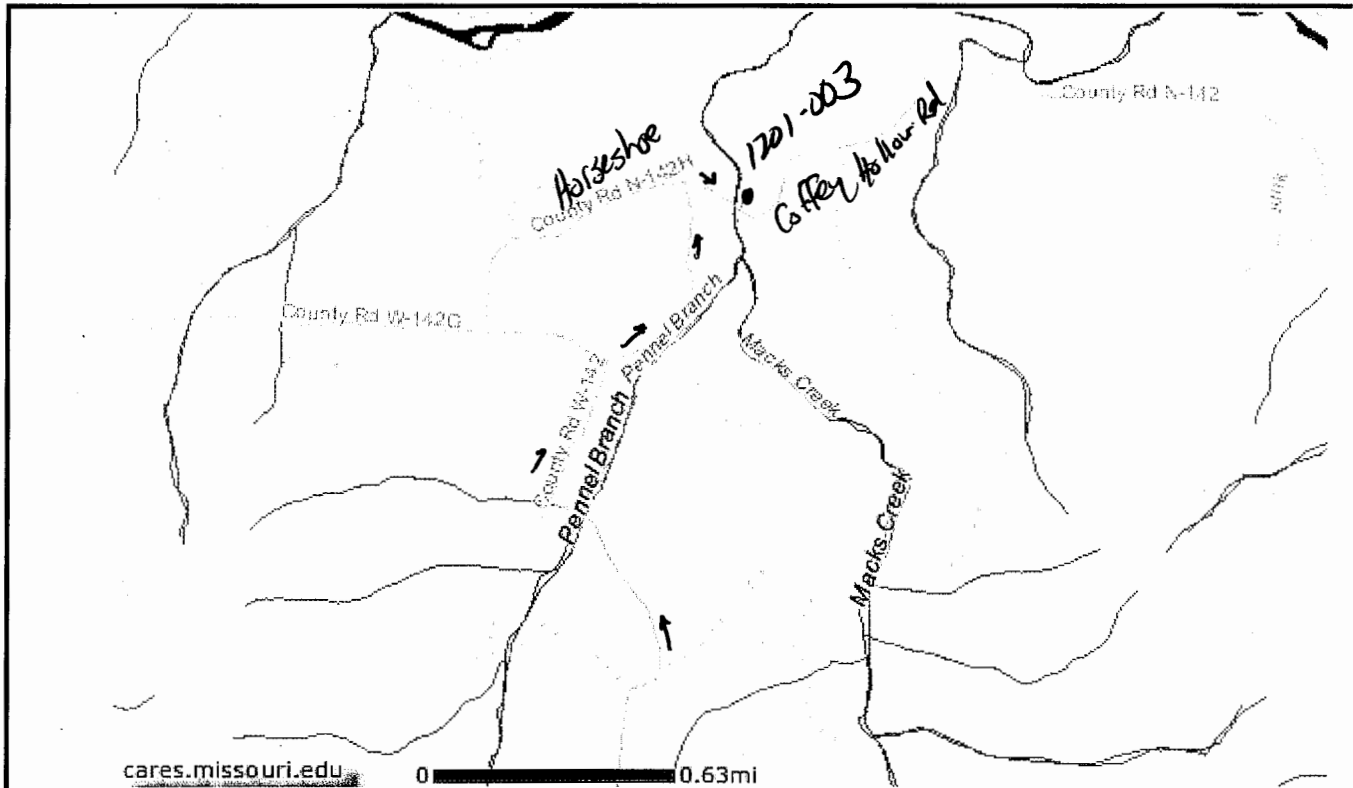


Legend

Location Map



Macks Creek



Legend

- Water Quality Information System (WQIS)

Roads and Highways

- Interstate
- U.S. Highway
- State Numbered Highway
- State Lettered Highway
- Principal Road
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1:24,000 Rivers and Streams

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NHD Rivers and Streams

- Perennial Stream/River (cont)

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1:24,000 Water Bodies

- Lake or Pond
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- Reservoir
- Stream or River
- Swamp or Marsh
- Canal or Ditch
- Other Water Body

NHD Water Bodies

- Lake or Pond
- Lake or Pond (Intermittent)
- Reservoir
- Stream or River
- Swamp or Marsh
- Canal or Ditch

Location Map



Map prepared by:
<http://cares.missouri.edu>, 7/6,

Field Data Sheets for Recreational Use Stream Surveys

Data Sheet B - Site Characterization

(A separate data sheet must be completed for each site)

Missouri WBID #: <u>1201-001</u>	Site Location Description: <u>Mill School Rd</u> <u>Camden Co.</u>	
Site GPS Coordinates: <u>N 37.92831 W 92.91781</u>		
Date & Time: <u>7/14/05</u> <u>1:47 PM</u>	Facility Name: <u>Macks Creek Sr Citizen HS</u>	
Personnel: <u>Aaron Griebner</u>	Permit Number: <u>MO 0109452</u>	
Current Weather Conditions: <u>Partly Cloudy 87°F</u>	Weather Conditions for Past 7 days: <u>Hot, Dry</u>	
Photo Ids: Upstream: <u>78-</u>	Downstream: <u>79</u>	Other:

Uses Observed*:

<input type="checkbox"/> Swimming	<input type="checkbox"/> Skin diving	<input type="checkbox"/> SCUBA diving	<input type="checkbox"/> Tubing	<input type="checkbox"/> Water skiing
<input type="checkbox"/> Wind surfing	<input type="checkbox"/> Kayaking	<input type="checkbox"/> Boating	<input type="checkbox"/> Wading	<input type="checkbox"/> Rafting
<input type="checkbox"/> Hunting	<input type="checkbox"/> Trapping	<input type="checkbox"/> Fishing	<input checked="" type="checkbox"/> None of the above	<input type="checkbox"/> Other:

Describe: (include number of individuals recreating, frequency of use, photo-documentation of evidence of recreational uses, etc.)
Aquatic life - fish, frogs, snakes

Surrounding Conditions*: (Mark all that promote or impede recreational uses. Attach photos of evidence or unusual items of interest.)

<input type="checkbox"/> City/county parks	<input type="checkbox"/> Playgrounds	<input type="checkbox"/> MDC conservation lands	<input type="checkbox"/> Urban areas	<input type="checkbox"/> Campgrounds
<input type="checkbox"/> Boating accesses	<input type="checkbox"/> State parks	<input type="checkbox"/> National forests	<input type="checkbox"/> Nature trails	<input type="checkbox"/> Stairs/walkway
<input type="checkbox"/> No trespass sign	<input checked="" type="checkbox"/> Fence	<input type="checkbox"/> Steep slopes	<input checked="" type="checkbox"/> Other: <u>Pasture, livestock, Hills</u> <u>Timber</u>	

Evidence of Human Use*:

<input checked="" type="checkbox"/> Roads	<input type="checkbox"/> Foot paths/prints	<input type="checkbox"/> Dock/platform	<input type="checkbox"/> Livestock Watering	<input type="checkbox"/> RV / ATV Tracks
<input type="checkbox"/> Rope swings	<input type="checkbox"/> Camping Sites	<input type="checkbox"/> Fire pit/ring	<input type="checkbox"/> NPDES Discharge	<input type="checkbox"/> Fishing Tackle
<input type="checkbox"/> Other:				

Site Locations Map(s): Attach a map of entire segment with assessment sites clearly labeled. Mark any other items that may be of interest. (Include photographs)

*Some of this information is not intended to directly influence a decision on any one particular recreational use analysis but may point to conditions that need further analysis or that effect another use.

Field Data Sheets for Recreational Use Stream Surveys

Data Sheet B - Site Characterization

Page Two - WBID # 1201001:

Stream Morphology:

Upstream View Physical Dimensions:

<input type="checkbox"/> Riffle	Width (ft):	Length (ft):	Avg. Depth (ft):	Max. Depth (ft):
<input checked="" type="checkbox"/> Run	Width (ft): <u>10</u>	Length (ft): <u>60</u>	Avg. Depth (ft): <u>1.0 ft</u>	Max. Depth (ft): <u>1.0 ft</u>
<input type="checkbox"/> Pool	Width (ft):	Length (ft):	Avg. Depth (ft):	Max. Depth (ft):
<input checked="" type="checkbox"/> Flow	Present?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Estimated (ft ³ /sec): <u>1 ft³/sec</u>	

Downstream View Physical Dimensions:

<input type="checkbox"/> Riffle	Width (ft):	Length (ft):	Avg. Depth (ft):	Max. Depth (ft):
<input type="checkbox"/> Run	Width (ft):	Length (ft):	Avg. Depth (ft):	Max. Depth (ft):
<input checked="" type="checkbox"/> Pool	Width (ft): <u>15</u>	Length (ft): <u>30</u>	Avg. Depth (ft): <u>1.0 ft</u>	Max. Depth (ft): <u>1.5 ft</u>
<input checked="" type="checkbox"/> Flow	Present?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Estimated (ft ³ /sec): <u>0.25 ft³/sec</u>	

Substrate*: (These values should add up to 100%.)

<u>35</u> % Cobble	<u>26</u> % Gravel	<u>20</u> % Sand	% Silt	% Mud/Clay	<u>25</u> % Bedrock
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Aquatic Vegetation*: (note amount of vegetation or algal growth at the assessment site)

<u>10% algae → mostly on upstream segment</u>

Water Characteristics*: (Mark all that apply.)

Odor:	<input type="checkbox"/> Sewage	<input type="checkbox"/> Musky	<input type="checkbox"/> Chemical	<input checked="" type="checkbox"/> None	<input type="checkbox"/> Other:
Color:	<input checked="" type="checkbox"/> Clear	<input type="checkbox"/> Green	<input type="checkbox"/> Gray	<input type="checkbox"/> Milky	<input type="checkbox"/> Other:
Bottom Deposit:	<input type="checkbox"/> Sludge	<input type="checkbox"/> Solids	<input checked="" type="checkbox"/> Fine sediments	<input type="checkbox"/> None	<input type="checkbox"/> Other:
Surface Deposit:	<input type="checkbox"/> Oil	<input type="checkbox"/> Scum	<input type="checkbox"/> Foam	<input type="checkbox"/> None	<input checked="" type="checkbox"/> Other: <u>algae - upstream</u>

Comments: Please attach additional comments (including information from interviews) to this form.

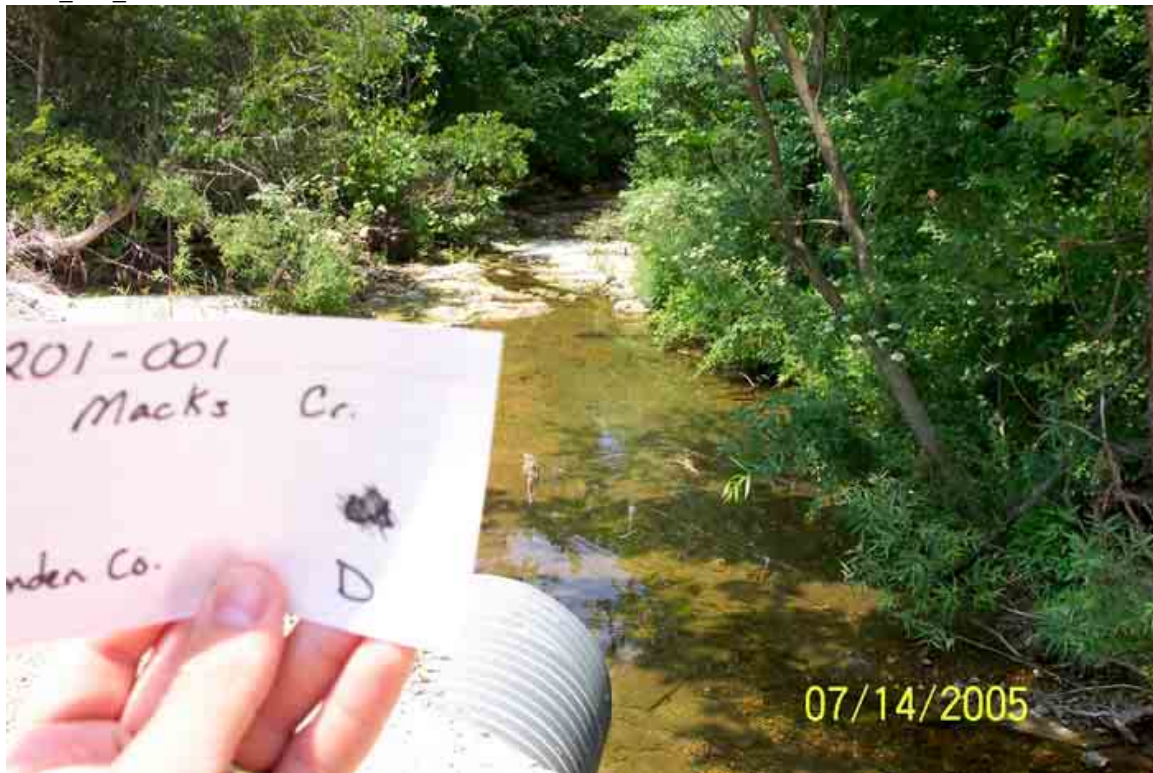
*This information is not to be used solely for removal of a recreational use designation but rather is to provide a more comprehensive understanding of water conditions. Consequently, this information is not intended to directly influence a decision on the recreation use analysis but may point to conditions that need further analysis or that effect another use.

I, the undersigned, hereby affirm to the best of my knowledge, that all information reported on this UAA datasheet is true and accurate.

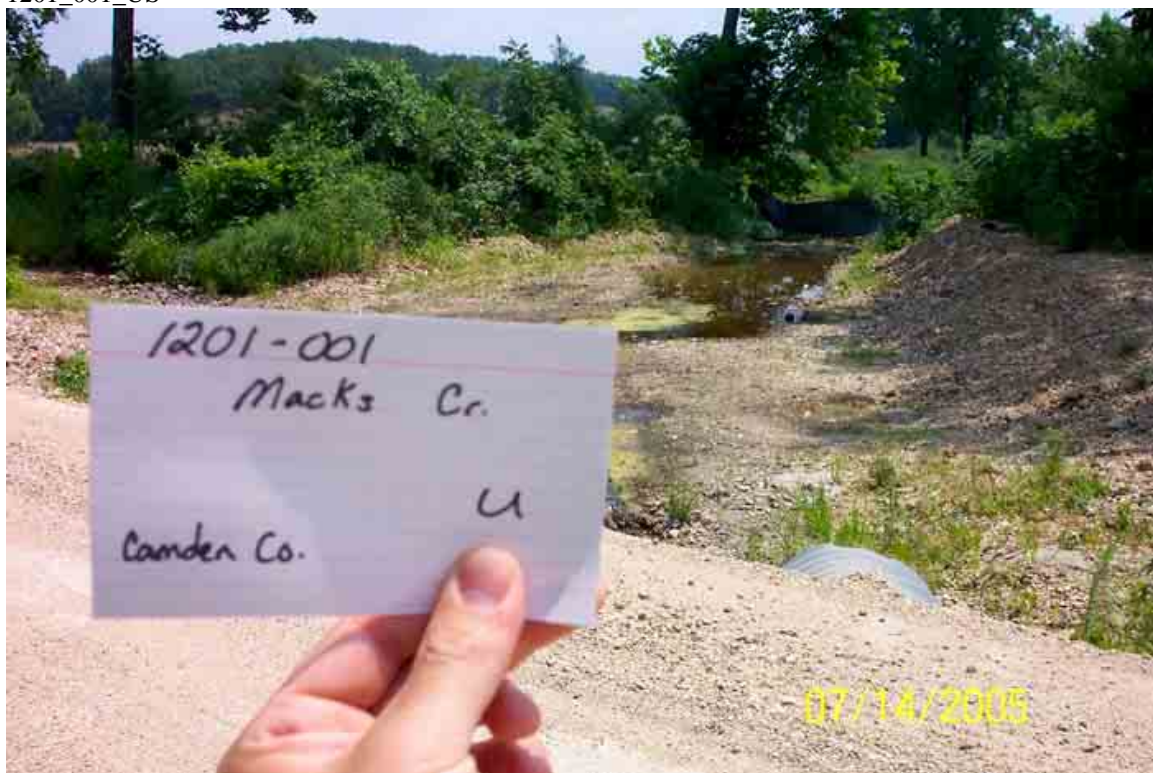
Signed: Baron Bleifuss Date: 7/14/05

Organization: M. DNR - KCRD Position: Env. Specialist

1201_001_DS



1201_001_US



Field Data Sheets for Recreational Use Stream Surveys

Data Sheet B - Site Characterization

(A separate data sheet must be completed for each site)

Missouri WBID #: <u>1201-002</u>	Site Location Description: <u>Jack Bush Rd. Camden Co.</u>	
Site GPS Coordinates: <u>N 37.96948 W 92.99600</u>		
Date & Time: <u>7/14/05 2:14 PM</u>	Facility Name: <u>Macks Creek Sr Citizen HS</u>	
Personnel: <u>Aaron Bleibaum</u>	Permit Number: <u>MO 0109452</u>	
Current Weather Conditions: <u>Humid, Clear 85°F</u>	Weather Conditions for Past 7 days: <u>Hot, Dry</u>	
Photo Ids: Upstream: <u>20</u>	Downstream: <u>81</u>	Other:

Uses Observed*:

<input type="checkbox"/> Swimming	<input type="checkbox"/> Skin diving	<input type="checkbox"/> SCUBA diving	<input type="checkbox"/> Tubing	<input type="checkbox"/> Water skiing
<input type="checkbox"/> Wind surfing	<input type="checkbox"/> Kayaking	<input type="checkbox"/> Boating	<input type="checkbox"/> Wading	<input type="checkbox"/> Rafting
<input type="checkbox"/> Hunting	<input type="checkbox"/> Trapping	<input type="checkbox"/> Fishing	<input checked="" type="checkbox"/> None of the above	<input type="checkbox"/> Other:

Describe: (include number of individuals recreating, frequency of use, photo-documentation of evidence of recreational uses, etc.)

Roosters nearby
Fish in stream - downstream pool.

Surrounding Conditions*:

(Mark all that promote or impede recreational uses. Attach photos of evidence or unusual items of interest.)

<input type="checkbox"/> City/county parks	<input type="checkbox"/> Playgrounds	<input type="checkbox"/> MDC conservation lands	<input type="checkbox"/> Urban areas	<input type="checkbox"/> Campgrounds
<input type="checkbox"/> Boating accesses	<input type="checkbox"/> State parks	<input type="checkbox"/> National forests	<input type="checkbox"/> Nature trails	<input type="checkbox"/> Stairs/walkway
<input checked="" type="checkbox"/> No trespass sign	<input checked="" type="checkbox"/> Fence	<input type="checkbox"/> Steep slopes	<input checked="" type="checkbox"/> Other: <u>Pasture, Hills, Timber, Farm House</u>	

Evidence of Human Use*:

<input checked="" type="checkbox"/> Roads	<input type="checkbox"/> Foot paths/prints	<input type="checkbox"/> Dock/platform	<input type="checkbox"/> Livestock Watering	<input type="checkbox"/> RV / ATV Tracks
<input type="checkbox"/> Rope swings	<input type="checkbox"/> Camping Sites	<input type="checkbox"/> Fire pit/ring	<input type="checkbox"/> NPDES Discharge	<input type="checkbox"/> Fishing Tackle
<input type="checkbox"/> Other:				

Site Locations Map(s):

Attach a map of entire segment with assessment sites clearly labeled. Mark any other items that may be of interest. (Include photographs)

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Field Data Sheets for Recreational Use Stream Surveys

Data Sheet B - Site Characterization

Page Two - WBID # 1201-002:

Stream Morphology:

Upstream View Physical Dimensions:

<input type="checkbox"/> Riffle	Width (ft):	Length (ft):	Avg. Depth (ft):	Max. Depth (ft):
<input checked="" type="checkbox"/> Run	Width (ft): <u>50</u>	Length (ft): <u>150</u>	Avg. Depth (ft): <u>0 ft</u>	Max. Depth (ft): <u>0 ft</u>
<input type="checkbox"/> Pool	Width (ft):	Length (ft):	Avg. Depth (ft):	Max. Depth (ft):
<input type="checkbox"/> Flow	Present? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Estimated (ft ³ /sec): <u>Dry</u>		

Downstream View Physical Dimensions:

<input type="checkbox"/> Riffle	Width (ft):	Length (ft):	Avg. Depth (ft):	Max. Depth (ft):
<input type="checkbox"/> Run	Width (ft):	Length (ft):	Avg. Depth (ft):	Max. Depth (ft):
<input checked="" type="checkbox"/> Pool	Width (ft): <u>45</u>	Length (ft): <u>100</u>	Avg. Depth (ft): <u>1.0 ft</u>	Max. Depth (ft): <u>1.5 ft</u>
<input type="checkbox"/> Flow	Present? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Estimated (ft ³ /sec):		

Substrate*: (These values should add up to 100%.)

<u>50</u> % Cobble	<u>20</u> % Gravel	<u>10</u> % Sand	<u>20</u> % Silt	% Mud/Clay	% Bedrock
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Aquatic Vegetation*: (note amount of vegetation or algal growth at the assessment site)

<u>10% algae on rocks</u>

Water Characteristics*: (Mark all that apply.)

Odor:	<input type="checkbox"/> Sewage	<input type="checkbox"/> Musky	<input type="checkbox"/> Chemical	<input checked="" type="checkbox"/> None	<input type="checkbox"/> Other:
Color:	<input checked="" type="checkbox"/> Clear	<input type="checkbox"/> Green	<input type="checkbox"/> Gray	<input type="checkbox"/> Milky	<input type="checkbox"/> Other:
Bottom Deposit:	<input type="checkbox"/> Sludge	<input type="checkbox"/> Solids	<input checked="" type="checkbox"/> Fine sediments	<input type="checkbox"/> None	<input type="checkbox"/> Other:
Surface Deposit:	<input type="checkbox"/> Oil	<input checked="" type="checkbox"/> Scum	<input type="checkbox"/> Foam	<input type="checkbox"/> None	<input type="checkbox"/> Other:

Comments: Please attach additional comments (including information from interviews) to this form.

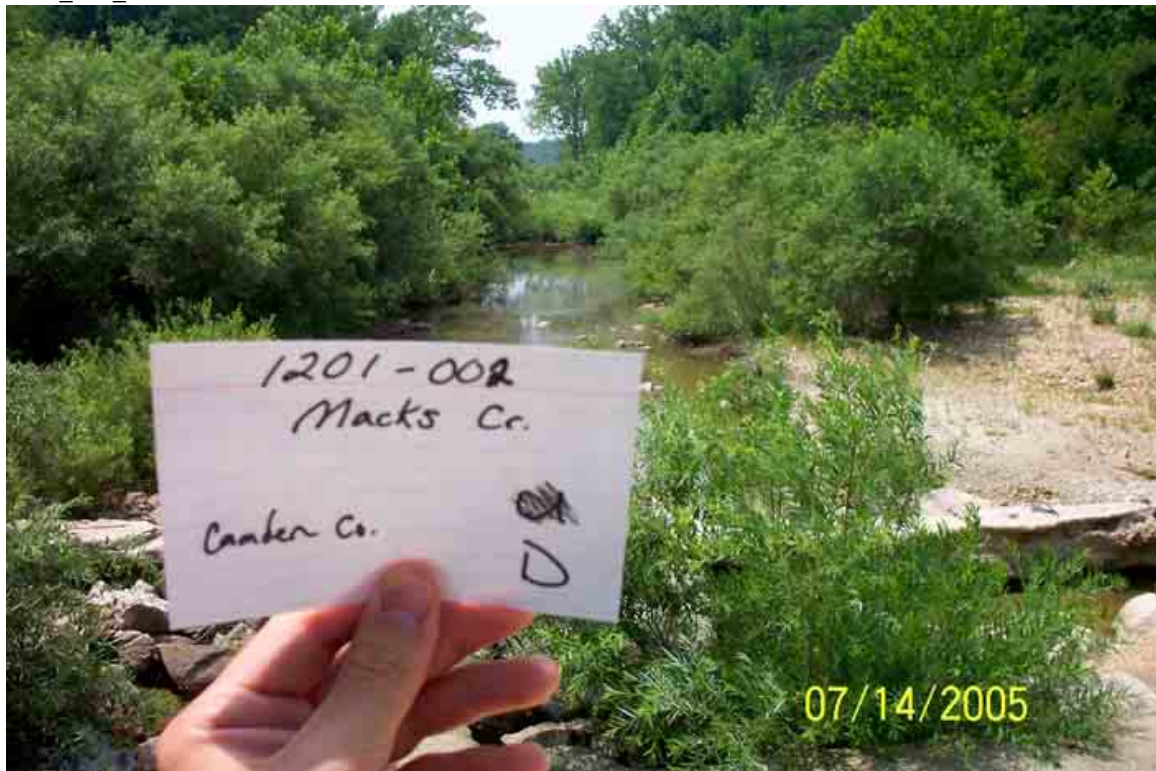
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I, the undersigned, hereby affirm to the best of my knowledge, that all information reported on this UAA datasheet is true and accurate.

Signed: Baron Bleifuss Date: 7/14/05

Organization: Mo DNR Position: Env. Specialist

1201_002_DS



1201_002_US



Field Data Sheets for Recreational Use Stream Surveys

Data Sheet B - Site Characterization

(A separate data sheet must be completed for each site)

Missouri WBID #: 1201-003	Site Location Description: Coffey Hollow Rd Camden Co.	
Site GPS Coordinates: N 38.00853 W 93.03874		
Date & Time: 7/14/05 2:40 PM	Facility Name: Macks Creek Sr Citizen HS	
Personnel: Aaron Rie-Saun	Permit Number: MO 0109452	
Current Weather Conditions: Partly Cloudy 85°F	Weather Conditions for Past 7 days: Hot, Dry	
Photo Ids: Upstream: 82	Downstream: 83	Other:

Uses Observed*:

<input type="checkbox"/> Swimming	<input type="checkbox"/> Skin diving	<input type="checkbox"/> SCUBA diving	<input type="checkbox"/> Tubing	<input type="checkbox"/> Water skiing
<input type="checkbox"/> Wind surfing	<input type="checkbox"/> Kayaking	<input type="checkbox"/> Boating	<input type="checkbox"/> Wading	<input type="checkbox"/> Rafting
<input type="checkbox"/> Hunting	<input type="checkbox"/> Trapping	<input type="checkbox"/> Fishing	<input checked="" type="checkbox"/> None of the above	<input type="checkbox"/> Other:

Describe: (include number of individuals recreating, frequency of use, photo-documentation of evidence of recreational uses, etc.)

Aquatic life in stream

Surrounding Conditions*: (Mark all that promote or impede recreational uses. Attach photos of evidence or unusual items of interest.)

<input type="checkbox"/> City/county parks	<input type="checkbox"/> Playgrounds	<input type="checkbox"/> MDC conservation lands	<input type="checkbox"/> Urban areas	<input type="checkbox"/> Campgrounds
<input type="checkbox"/> Boating accesses	<input type="checkbox"/> State parks	<input type="checkbox"/> National forests	<input type="checkbox"/> Nature trails	<input type="checkbox"/> Stairs/walkway
<input checked="" type="checkbox"/> No trespass sign	<input checked="" type="checkbox"/> Fence	<input type="checkbox"/> Steep slopes	<input checked="" type="checkbox"/> Other: Hills, Livestock, Pasture Farm House	

Evidence of Human Use*:

<input checked="" type="checkbox"/> Roads	<input type="checkbox"/> Foot paths/prints	<input type="checkbox"/> Dock/platform	<input type="checkbox"/> Livestock Watering	<input type="checkbox"/> RV / ATV Tracks
<input type="checkbox"/> Rope swings	<input type="checkbox"/> Camping Sites	<input type="checkbox"/> Fire pit/ring	<input type="checkbox"/> NPDES Discharge	<input type="checkbox"/> Fishing Tackle
<input type="checkbox"/> Other:				

Site Locations Map(s): Attach a map of entire segment with assessment sites clearly labeled. Mark any other items that may be of interest. (Include photographs)

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Field Data Sheets for Recreational Use Stream Surveys

Page Two – WBID # 1201-063 Data Sheet B - Site Characterization

Stream Morphology:

Upstream View Physical Dimensions:

<input type="checkbox"/> Riffle	Width (ft):	Length (ft):	Avg. Depth (ft):	Max. Depth (ft):
<input type="checkbox"/> Run	Width (ft):	Length (ft):	Avg. Depth (ft):	Max. Depth (ft):
<input checked="" type="checkbox"/> Pool	Width (ft): <u>60</u>	Length (ft): <u>150</u>	Avg. Depth (ft): <u>1.5 ft</u>	Max. Depth (ft): <u>2 ft</u>
<input checked="" type="checkbox"/> Flow	Present?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Estimated (ft ³ /sec): <u>0.5 ft³/sec</u>	

Downstream View Physical Dimensions:

<input type="checkbox"/> Riffle	Width (ft):	Length (ft):	Avg. Depth (ft):	Max. Depth (ft):
<input type="checkbox"/> Run	Width (ft):	Length (ft):	Avg. Depth (ft):	Max. Depth (ft):
<input checked="" type="checkbox"/> Pool	Width (ft): <u>60</u>	Length (ft): <u>200</u>	Avg. Depth (ft): <u>1.5 ft</u>	Max. Depth (ft): <u>2 ft</u>
<input checked="" type="checkbox"/> Flow	Present?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Estimated (ft ³ /sec): <u>0.5 ft³/sec</u>	

Substrate*: (These values should add up to 100%.)

<u>40</u> % Cobble	<u>20</u> % Gravel	<u>20</u> % Sand	<u>10</u> % Silt	% Mud/Clay	<u>10</u> % Bedrock
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Aquatic Vegetation*: (note amount of vegetation or algal growth at the assessment site)

<u>2% algae</u>

Water Characteristics*: (Mark all that apply.)

Odor:	<input type="checkbox"/> Sewage	<input type="checkbox"/> Musky	<input type="checkbox"/> Chemical	<input checked="" type="checkbox"/> None	<input type="checkbox"/> Other:
Color:	<input checked="" type="checkbox"/> Clear	<input type="checkbox"/> Green	<input type="checkbox"/> Gray	<input type="checkbox"/> Milky	<input type="checkbox"/> Other:
Bottom Deposit:	<input type="checkbox"/> Sludge	<input type="checkbox"/> Solids	<input checked="" type="checkbox"/> Fine sediments	<input type="checkbox"/> None	<input type="checkbox"/> Other:
Surface Deposit:	<input type="checkbox"/> Oil	<input checked="" type="checkbox"/> Scum	<input type="checkbox"/> Foam	<input type="checkbox"/> None	<input type="checkbox"/> Other:

Comments: Please attach additional comments (including information from interviews) to this form.

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I, the undersigned, hereby affirm to the best of my knowledge, that all information reported on this UAA datasheet is true and accurate.

Signed: Ramon Bleiburn Date: 7/14/05
 Organization: Mo. DNR Position: Env. Specialist

1201_003_DS



1201_003_US

